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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/664,265	09/17/2003	Michel Lawrence	E14.2P-10817-US02	3406

490 7590 03/01/2006

VIDAS, ARRETT & STEINKRAUS, P.A.  
6109 BLUE CIRCLE DRIVE  
SUITE 2000  
MINNETONKA, MN 55343-9185

EXAMINER
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BOYER, CHARLES I

ART UNIT	PAPER NUMBER
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1751

DATE MAILED: 03/01/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 10/664,265	<b>Applicant(s)</b> LAWRENCE ET AL.	
	<b>Examiner</b> Charles I. Boyer	<b>Art Unit</b> 1751	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 22 December 2005.  
 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.  
 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 43-57 is/are pending in the application.  
     4a) Of the above claim(s) 53-57 is/are withdrawn from consideration.  
 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.  
 6) ☒ Claim(s) 43-52 is/are rejected.  
 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.  
 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.  
 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
     a) ☐ All    b) ☐ Some \* c) ☐ None of:  
         1. ☐ Certified copies of the priority documents have been received.  
         2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
         3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
     \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

### **DETAILED ACTION**

This action is responsive to applicants' amendment and response received December 22, 2005. Claims 43-57 are currently pending.

#### ***Election/Restrictions***

1. Restriction to one of the following inventions is required under 35 U.S.C. 121:
  - I. Claims 43-52, drawn to a method of cleaning PET containers using an alkyl diphenylene oxide disulfonate, classified in class 510, subclass 243.
  - II. Claims 53-55, drawn to a method of cleaning PET containers using polyether sulfonates or phosphates, classified in class 510, subclass 243.
  - III. Claims 56 and 57, drawn to a method of cleaning PET containers using an alkanolamide, classified in class 510, subclass 243.

The inventions are distinct, each from the other because of the following reasons:

2. Inventions I-III are unrelated. Inventions are unrelated if it can be shown that they are not disclosed as capable of use together and they have different designs, modes of operation, and effects (MPEP § 802.01 and § 806.06). In the instant case, the different inventions contain completely different compositions. Prior art that would anticipate or render obvious one invention would not necessarily anticipate or render obvious the other inventions.
3. Because these inventions are independent or distinct for the reasons given above and the inventions require a different field of search (see MPEP § 808.02), restriction for examination purposes as indicated is proper.

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4. During a telephone conversation with Lisa Lindquist on February 23, 2006 a provisional election was made with traverse to prosecute the invention of group I, claims 43-52. Affirmation of this election must be made by applicant in replying to this Office action. Claims 53-57 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.

5. Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

#### ***Claim Rejections - 35 USC § 102***

All prior art rejections as they pertained to claims 1-42 are withdrawn in view of the cancellation of these claims.

#### ***Claim Rejections - 35 USC § 103***

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 43-45, and 47-50 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cords et al, US 6,554,005.

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Cords et al teach a cleaning method for polyethylene terephthalate containers (see abstract). An example of such a composition comprises 5% EO/PO block copolymer, 10% gluconic acid, 8% of a mixture of two phosphonic acid sequestrants, and 12% sodium cumene sulfonate coupler (col. 9, example 2A). Preferred couplers of the invention include C12 diphenyl oxide disulfonate (col. 6, lines 14-24). Accordingly, it would have been obvious to one of ordinary skill in the art to use C12 diphenyl oxide disulfonate as the coupler in example 2A as couplers are an essential part of the invention and the reference teaches this compound as a preferred coupler.

8. Claims 43-46 and 49-52 are rejected under 35 U.S.C. 103(a) as being unpatentable over Peters et al, US 6,090,860.

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Peters et al teach a method of recycling PET containers utilizing a composition comprising sodium hexyldiphenylether disulfonate as a lifting agent (col. 13, example 3). Preferred lifting agents of the invention include dodecyl diphenyl oxide disulfonate and hexadecyl diphenyl oxide disulfonate (col. 10, lines 49-65). Suitable basic compounds of the invention include phosphates (col. 7, lines 49-53), suitable acids include organic phosphorous acids (col. 8, lines 39-40), and suitable foamers of the invention include polyphosphates and gluconates (col. 12, lines 59-64). Note that anti-foamers such as organic polymers, as well as defoaming agents are taught as preferred additives in these compositions (col. 12, lines 49-58). It would have been obvious to one of ordinary skill in the art to formulate a composition containing dodecyl diphenyl oxide disulfonate or hexadecyl diphenyl oxide disulfonate, phosphates, gluconates, and organic polymer defoamers, of which EO/PO block copolymers are among the most common, as all of these components are taught as preferred or suitable additives of the PET treatment compositions of the reference. The examiner acknowledges that the phosphates and gluconates of the reference are not taught as sequestrants, however, the examiner maintains that as the reference teaches them as suitable additives, their inclusion is still obvious even if they are added for a different reason than that envisioned by applicants.

1. Claim 43-52 are rejected under 35 U.S.C. 103(a) as being unpatentable over Man et al, US 6,838,422 in view of Rossio, 5,223,162.

Man et al teach a plastics compatible detergent comprising up to 10% anionic surfactant, up to 10% EO/PO copolymer surfactant, and up to 10% chelant (col. 13,

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table 3). Preferred anionic surfactants of the invention are alkyl diphenylene oxide disulfonates wherein a C12 alkyl group is preferred and the alkyl group may be as high as C18 (col. 11, lines 24-36). Note that the chelating agents of the invention are those that are conventionally used in the detergent industry. Man et al do not teach the specific chelants presently claimed.

Rossio teaches a bottle washing composition for polyalkylene terephthalate comprising anionic surfactant, a phosphonate sequestrant, and sodium gluconate (col. 7, example III). It would have been obvious to one of ordinary skill in the art to incorporate the chelants of Rossio in the plastic cleaning composition of Man et al as Man et al teach the chelating agents of their invention are those that are conventionally used in the detergent industry and Rossio teaches a mixture of phosphonate and gluconate chelants as particularly desirable for polyethylene terephthalate cleaning compositions.

### ***Conclusion***

2. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not

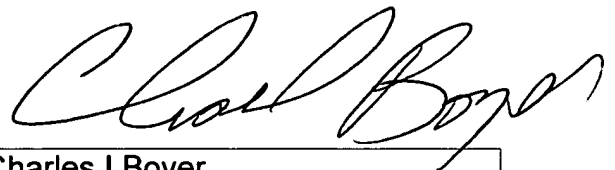
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mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Charles I. Boyer whose telephone number is 571 272 1311. The examiner can normally be reached on M-Th 9:30 to 6:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Douglas McGinty can be reached on 571 272 1029. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



	<p>Charles I Boyer Primary Examiner Art Unit 1751</p>
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